

What is claimed is:

1. A polishing puck assembly for holding a fiber optic connector comprising:

a puck member including a planar bottom, and a longitudinal axis perpendicular to the planar bottom, the puck member defining a hole through the puck member coaxial with the longitudinal axis, the hole sized for receiving an optical fiber of the fiber optic connector;

a weight slidably mounted to the puck member, the weight including a lower surface facing in the same direction as the planar bottom surface of the puck member;

the puck member and the weight defining a chamber for receipt of a fiber optic connector wherein the lower surface of the weight rests on a rearward facing component of the connector, and wherein the optical fiber protrudes through the hole through the puck member.

2. The puck assembly of claim 1, wherein the puck member includes a base portion, and an upper portion, the upper portion releasably mounted to the base portion, the upper portion including a longitudinal slot extending parallel to the longitudinal axis.

3. The puck assembly of claim 2, wherein the upper portion is mounted to the base portion with a ball and groove arrangement, wherein the ball is spring loaded, and wherein the groove engaged with the ball is circular.

4. The puck assembly of claim 2, wherein the upper portion includes an axial bore and an inner shoulder transverse to the axial bore, a lower portion of the axial bore defining a first diameter, an upper portion of the axial bore defining an inner

diameter greater than the inner diameter of the lower portion, the weight including a shoulder engageable with the shoulder of the upper portion to limit sliding movement of the weight relative to the upper portion.

5. The puck assembly of claim 1, wherein the weight includes a longitudinal slot extending parallel to the longitudinal axis.

6. The puck assembly of claim 1, wherein the weight is releasably mounted to the puck member.

7. The puck assembly of claim 6, wherein the releasable mount includes a ball and groove arrangement, wherein the ball is spring loaded, and wherein the groove engaged with the ball is linear and extends parallel to the longitudinal axis.

8. The puck assembly of claim 1, wherein the planar bottom includes a plurality of linear grooves, the linear grooves defining a crosshatched pattern.

9. The puck assembly of claim 1, further comprising a polishing tray having a base, and a cylindrical sidewall defining a cylindrically-shaped pocket.

10. The puck assembly of claim 9, further comprising a circular layer polishing material received in the pocket.

11. The puck assembly of claim 10, further comprising a circular Mylar sheet positioned between the base and the polishing material.

12. The puck assembly of claim 11, further comprising a circular foam sheet positioned between the base and the Mylar sheet.

13. The puck assembly of claim 10, further comprising a guide received in the pocket including a cylindrical outer surface, and a cylindrical inner surface wherein

the cylindrical inner surface has an axis offset from an axis of the cylindrical outer surface.

14. A palette device for holding a sheet of fiber optic polishing media, comprising:

a base having a top surface;

a sidewall extending up from the base, and defining a cylindrical surface defining a first cylindrical pocket.

15. The palette device of claim 14, wherein the sidewall defines further cylindrical surfaces defining second, third and fourth cylindrical pockets.

16. The palette device of claim 15, wherein the base has a central hole, and wherein an edge of the base includes a notch.

17. The palette device of claim 14, further comprising a circular layer of polishing material positioned in the first cylindrical pocket.

18. The palette device of claim 17, further comprising a circular Mylar sheet positioned between the base and the polishing media.

19. The palette device of claim 18, further comprising a circular foam sheet positioned between the base and the Mylar sheet.

20. The palette device of claim 15, further comprising four circular layers of polishing material, one layer positioned in each of the first, second, third and fourth cylindrical pockets.

21. The palette of claim 14, further comprising a guide received in the first cylindrical pocket including a cylindrical outer surface, and a cylindrical inner surface wherein the cylindrical inner surface has an axis offset from an axis of the cylindrical outer surface.

22. The palette of claim 15, further comprising a guide received in one of the first, second, third and fourth cylindrical pockets including a cylindrical outer surface, and a cylindrical inner surface wherein the cylindrical inner surface has an axis offset from an axis of the cylindrical outer surface.

23. The palette of claim 15, wherein the sidewall includes a gap extending to the top surface.

24. A method of polishing a fiber optic connector comprising the steps of:

positioning a fiber optic connector in a puck member, wherein a fiber and a supporting ferrule of the fiber optic connector is positioned in an opening through the puck member;

slidably mounting a weight to the puck member, wherein the weight is slidable in a direction of the longitudinal axis;

resting the weight on a rearward-facing surface of the fiber optic connector, wherein the ferrule protrudes below the bottom surface of the puck member;

moving the puck member relative to a polishing surface to polish the fiber.

25. The method of claim 24, further comprising the step of positioning a cable connected to the fiber optic connector in a slot extending through the weight.

26. The method of claim 24, wherein the positioning step comprises the steps of mounting the fiber optic connector to a nest of a puck base of the puck member, positioning a cable connected to the fiber optic connector in a slot extending through a puck top of the puck member, and snapping the puck top to the puck base by pushing the puck top in a direction of a longitudinal axis of the puck base.

27. The method of claim 26, wherein the step of slideably mounting the weight includes the steps of positioning the cable in a slot extending through the weight, and snapping the weight to the puck top by pushing the weight in a direction of the longitudinal axis of the puck base.

28. A method of polishing a fiber optic connector comprising the steps of:

providing a palette including a plurality of pockets on a top surface;

positioning a layer of polishing material in each pocket, wherein at least two of the layers are different;

mounting a fiber optic connector in a polishing puck;

moving the polishing puck with the attached connector relative to a first layer of polishing material in a first pocket of the plurality of pockets to provide a first polish to an end face of the fiber optic connector;

moving the polishing puck and the connector relative to a second layer of polishing material in a second pocket of the plurality of pockets to provide a second polishing to the end face.

29. The method of claim 28, further comprising the step of moving the moving the polishing puck and the connector relative to a third layer of polishing

material in a third pocket of the plurality of pockets to provide a third polishing to the end face.

30. The method of claim 29, further comprising the step of moving the moving the polishing puck and the connector relative to a fourth layer of polishing material in a fourth pocket of the plurality of pockets to provide a fourth polishing to the end face.

31. The method of claim 28, wherein the first and second pockets are cylindrically shaped, and the first and second layers of polishing material have a circular outer perimeter sized to fit within the first and second pockets, respectively.